

BEST AVAILABLE COPY

INTERNATIONAL SEARCH REPORT

International Application No

PCT/DE2004/001837

A. CLASSIFICATION OF SUBJECT MATTER
IPC 7 C12Q1/68

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 C12Q

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

BIOSIS, EPO-Internal, WPI Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 6 331 393 B1 (LAIRD PETER W ET AL) 18 December 2001 (2001-12-18) the whole document ---	1-31
Y	US 2003/087240 A1 (WHITCOMBE DAVID MARK ET AL) 8 May 2003 (2003-05-08) the whole document ---	1-31
Y	WO 99/66071 A (ZENECA LIMITED) 23 December 1999 (1999-12-23) the whole document ---	1-31
	-/-	

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art

"&" document member of the same patent family

Date of the actual completion of the international search

23 February 2005

Date of mailing of the international search report

21/03/2005

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Madlener, M

INTERNATIONAL SEARCH REPORT

International Application No

PCT/DE2004/001837

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	<p>WHITCOMBE D ET AL: "Detection of PCR products using self-probing amplicons and fluorescence"</p> <p>NATURE BIOTECHNOLOGY, NATURE PUBLISHING, US,</p> <p>vol. 17, no. 8, August 1999 (1999-08), pages 804-807, XP002226672</p> <p>ISSN: 1087-0156</p> <p>the whole document</p>	1-31
Y	<p>THELWELL N ET AL: "Mode of action and application of Scorpion primers to mutation detection."</p> <p>NUCLEIC ACIDS RESEARCH. 1 OCT 2000, vol. 28, no. 19,</p> <p>1 October 2000 (2000-10-01), pages 3752-3761, XP002247004</p> <p>ISSN: 1362-4962</p> <p>abstract</p>	1-31
Y	<p>WALKER N J: "Real-time and quantitative PCR: applications to mechanism-based toxicology."</p> <p>JOURNAL OF BIOCHEMICAL AND MOLECULAR TOXICOLOGY. 2001,</p> <p>vol. 15, no. 3, 2001, pages 121-127, XP009043979</p> <p>ISSN: 1095-6670</p> <p>the whole document</p>	1-31
Y	<p>COTTRELL S E ET AL: "SENSITIVE DETECTION OF DNA METHYLATION"</p> <p>ANNALS OF THE NEW YORK ACADEMY OF SCIENCES, NEW YORK ACADEMY OF SCIENCES, NEW YORK, NY, US,</p> <p>vol. 983, 2003, pages 120-130, XP009043996</p> <p>ISSN: 0077-8923</p> <p>the whole document</p>	1-31
Y	<p>LIU ZE-JUN ET AL: "Polymerase chain reaction-based methods of DNA methylation analysis."</p> <p>ANALYTICAL BIOCHEMISTRY,</p> <p>vol. 317, no. 2,</p> <p>15 June 2003 (2003-06-15), pages 259-265, XP002318907</p> <p>ISSN: 0003-2697</p> <p>the whole document</p>	1-31

-/-

BEST AVAILABLE COPY

INTERNATIONAL SEARCH REPORT

International Application No

PCT/DE2004/001837

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	<p>LO Y M DENNIS ET AL: "Quantitative analysis of aberrant p16 methylation using real-time quantitative methylation-specific polymerase chain reaction" CANCER RESEARCH, vol. 59, no. 16, 15 August 1999 (1999-08-15), pages 3899-3903, XP009044313 ISSN: 0008-5472 the whole document</p>	1-31
Y	<p>EADS C A ET AL: "MethyLight: a high-throughput assay to measure DNA methylation." NUCLEIC ACIDS RESEARCH. 15 APR 2000, vol. 28, no. 8, 15 April 2000 (2000-04-15), pages E32-1-E32-8, XP002318908 ISSN: 1362-4962 cited in the application the whole document</p>	1-31
Y	<p>SOLINAS A ET AL: "Duplex Scorpion primers in SNP analysis and FRET applications." NUCLEIC ACIDS RESEARCH. 15 OCT 2001, vol. 29, no. 20, 15 October 2001 (2001-10-15), pages E96-1-E96-9, XP002318909 ISSN: 1362-4962 the whole document</p>	1-31
Y	<p>PINERO DAVID ET AL: "Analytical challenges for the detection of genetic modifications in food and food products." AMERICAN BIOTECHNOLOGY LABORATORY, vol. 21, no. 4, March 2003 (2003-03), pages 40-41, XP009044306 ISSN: 0749-3223 the whole document</p>	1-31
Y	<p>MCKEEN CATHERINE M ET AL: "Synthesis of fluorophore and quencher monomers for use in scorpion primers and nucleic acid structural probes." ORGANIC & BIOMOLECULAR CHEMISTRY. 7 JUL 2003, vol. 1, no. 13, 7 July 2003 (2003-07-07), pages 2267-2275, XP002318910 ISSN: 1477-0520 the whole document</p>	1-31

-/--

INTERNATIONAL SEARCH REPORT

International Application No

PCT/DE2004/001837

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	LAIRD PETER W: "The power and the promise of DNA methylation markers." NATURE REVIEWS CANCER, vol. 3, no. 4, April 2003 (2003-04), pages 253-266, XP009044309 ISSN: 1474-175X abstract	1-31
Y	RAND K ET AL: "Conversion-specific detection of DNA methylation using real-time polymerase chain reaction (ConLight-MSP) to avoid false positives" METHODS : A COMPANION TO METHODS IN ENZYMOLOGY, ACADEMIC PRESS INC., NEW YORK, NY, US, vol. 27, no. 2, June 2002 (2002-06), pages 114-120, XP002296074 ISSN: 1046-2023 the whole document	1-31
Y	TRINH BINH N ET AL: "DNA methylation analysis by MethyLight technology" METHODS (ORLANDO), vol. 25, no. 4, December 2001 (2001-12), pages 456-462, XP002318911 ISSN: 1046-2023 the whole document	1-31
A	BRANSTEITTER R ET AL: "Activation-induced cytidine deaminase deaminates deoxycytidine on single-stranded DNA but requires the action of RNase" PROCEEDINGS OF THE NATIONAL ACADEMY OF SCIENCES OF USA, NATIONAL ACADEMY OF SCIENCE. WASHINGTON, US, vol. 100, no. 7, 1 April 2003 (2003-04-01), pages 4102-4107, XP002302399 ISSN: 0027-8424 the whole document	1-31
A	PHAM P ET AL: "Processive AID-catalysed cytosine deamination on single-stranded DNA simulates somatic hypermutation" NATURE, MACMILLAN JOURNALS LTD. LONDON, GB, vol. 424, no. 6944, 3 July 2003 (2003-07-03), pages 103-107, XP002302398 ISSN: 0028-0836 the whole document	1-31

BEST AVAILABLE COPY

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/DE2004/001837

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
US 6331393	B1	18-12-2001	AU 775798 B2 19-08-2004
			AU 4712200 A 05-12-2000
			CA 2372665 A1 23-11-2000
			EP 1185695 A1 13-03-2002
			JP 2002543852 T 24-12-2002
			WO 0070090 A1 23-11-2000
			US 2002086324 A1 04-07-2002
US 2003087240	A1	08-05-2003	AT 245198 T 15-08-2003
			AU 1250799 A 05-01-2000
			CA 2377508 A1 23-12-1999
			DE 69816488 D1 21-08-2003
			DE 69816488 T2 22-04-2004
			DK 1088102 T3 10-11-2003
			EP 1088102 A1 04-04-2001
			ES 2205572 T3 01-05-2004
			WO 9966071 A1 23-12-1999
			GB 2338301 A ,B 15-12-1999
			JP 2003534764 T 25-11-2003
			PT 1088102 T 31-12-2003
			US 6326145 B1 04-12-2001
WO 9966071	A	23-12-1999	AT 245198 T 15-08-2003
			AU 1250799 A 05-01-2000
			CA 2377508 A1 23-12-1999
			DE 69816488 D1 21-08-2003
			DE 69816488 T2 22-04-2004
			DK 1088102 T3 10-11-2003
			EP 1088102 A1 04-04-2001
			ES 2205572 T3 01-05-2004
			WO 9966071 A1 23-12-1999
			GB 2338301 A ,B 15-12-1999
			JP 2003534764 T 25-11-2003
			PT 1088102 T 31-12-2003
			US 6326145 B1 04-12-2001
			US 2003087240 A1 08-05-2003